

**SUBSTITUTE SPECIFICATION**

[0001]

**OPTICAL CONTACT MODULE**

This application is a 371 of PCT/KR03/02429, filed 11/12/2003.

[0002]

**FIELD OF THE INVENTION**

[0003] The present invention relates to an optical contact module, and more particularly, to an optical contact module capable of easily connecting a single optical fiber for transmitting an optical signal with an optical transmission terminal or an optical reception terminal in such a manner that the optical signal does not leak.

[0004]

**BACKGROUND**

[0005] Generally, an optical fiber comprises a core through which an optical signal is transmitted, a clad for enclosing the core, and a sheath layer for protecting the core and the clad.

[0006] In a case where a single optical fiber is used for a security system, the optical fiber is installed to measure dynamic or static changes in an optical signal transmitted through the optical fiber, or to measure physical fluctuation in the optical fiber using back scattering of the optical signal.

[0007] A technique regarding a security system using an optical fiber is disclosed in PCT Application No. PCT/KR02/0164 entitled "Security System Using Optical Fiber and Method of Controlling the Same" and filed on August 30, 2002 by the present applicant. Particularly, when the optical fiber is connected to an optical transmitter module and an optical receiver module in the invention of this application, an optical contact means capable of easily connecting optical fibers that have been cut to have appropriate lengths in place is required.

[0008] Further, the optical contact means for use in such a security system is required to have the function of avoiding optical loss and shielding noises from the outside by completely sealing a contact portion.